

IRRIGATION SYSTEM, TAILWATER RECOVERY

Design Survey

The following information shall be obtained and recorded in the field notes:

- a. Topographic information of the collection and/or sump area as needed.
- b. Topographic and alignment information for return facilities. Refer to requirements for applicable component, such as pipelines, lined ditches, pumping plants, etc.

Design Data

The following shall be considered minimum items to be considered in the design. Items essential to the design shall be recorded in the design notes.

- a. Inflow - outflow data to determine capacity requirements, including sediment accumulation estimates, for collection and return facilities.
- b. Soils investigation, as needed.
- c. Structural design for non-standard inlet, outlet, and pump sump structures.
- d. Refer to requirements for applicable component (pipeline, pumping plant), etc.) For additional items.
- e. Records indicating NRCS obligations regarding State and Federal regulations including NEPA requirements have been met.

Drawing and Specifications

The construction drawings shall include, but will not be limited to the following:

- a. Plan and maximum cross-section of excavation.
- b. Table of quantities.
- c. Location map.
- d. Refer to requirements for applicable component for additional items.

Layout Survey Notes

The following information shall be recorded in the field notes. For small systems, this phase may be combined with the design survey.

- a. Excavation slope stakes.
- b. Grade and alignment stakes for inlet, outlet and return facilities.

Compliance Checks

The complexity of the system will dictate the need for compliance checks during construction. Narratives of construction checks shall be recorded in the field notes. Compliance checks shall be recorded in the field notes and shall include but will not be limited to the following:

- a. Cross-sections and dimensions adequate to establish capacity measurement of storage facility.
- b. Controlling elevations, measurements, materials and alignment of structures.
- c. Statement of compliance.

As-Built Plans

As-Built drawings shall be prepared for all Tailwater Recovery Systems. These drawings shall reflect all significant changes in linear measurements, quantities, alignment, or design changes. If there were no significant changes, the original drawings shall be marked "As-Built".